

REMARKS

Reconsideration of the pending application is respectfully requested on the basis of the following particulars:

1. Amendments and Support for Same

By the Response, claim 1 has been amended to more particularly point out and distinctly claim the subject matter of the invention. No new matter has been added. Claim 2 has been cancelled, while claims 8-9 have been cancelled in the previously amendment. Claims 17-24 have been withdrawn previously. Accordingly, claims 1, 3-7 and 10-16 are respectfully submitted for consideration. Approval and entry of the amendments are respectfully requested.

2. Rejections under 35 U.S.C. §103(a)

With respect to the rejection of claims 1-3, 5, 7, 10, 15 and 16 under 35 U.S.C. § 103(a) as being unpatentable over Baldwin (US 5,982,284) in view of Loemker (US 5,583,489), to the rejection of claim 4 under 35 U.S.C. § 103(a) as being unpatentable over Baldwin in view of Loemker and Matsuzaki (US 4,783,646), and to the rejection of claims 6 and 11-14 under 35 U.S.C. § 103(a) as being unpatentable over Baldwin and Loemker in further view of Tirkkonen (WO 01/75843), Applicant respectfully traverses the rejection at least for the reason that Baldwin, Loemker, Tirkkonen, and Matsuzaki, combined or separately, fail to teach, disclose, or suggest all of the limitation recited in the rejected claims.

As amended, claim 1 recites among other things, a transponder arrangement including a chip and an antenna, the transponder arrangement being bonded to a textile base layer by a first adhesive layer, the chip being covered by a second adhesive layer and is sealed by the second adhesive layer against environmental influences including one of water, suds, chemical cleaning agents and heat by the second adhesive layer, and the antenna being sealed against the environmental influences by the first and the second adhesive layer. Support for the amended features can be found in, e.g., page 3, last paragraph, of the specification, as well as in the drawings. Further, the method recited in original claim 17 also supports such a structural arrangement.

According to the embodiment recited in amended claim 1, the second adhesive layer (4) covers and seals the chip (5) of the transponder arrangement. Chip 5 is in direct contact with the second adhesive layer (4), since the transponder arrangement according to the present invention has no housing or the like surrounding the chip and antenna.

In contrast with Applicant's claimed invention, Baldwin generally disclose elements that support and hold a RFID chip and antenna of a transponder. More specifically, in Baldwin the transponder is laminated between two insulation sheets of paper 12 and 36, as described in column 3, lines 16 and 17. Hence, an air gap 35 is provided around the perimeter of the RFID chip which eliminates the wrinkle that would otherwise be created by the edge of the RFID chip, as described in column 2, lines 44 to 46 of Baldwin.

Further, as shown in Fig. 4 of Baldwin, there is an adhesive-free region formed of an adhesive-deadening material 50 sandwiched between adhesive layer 18 and the chip 52 so as to create the essential air gap or air pocket 35 while antenna 53 has an adhesive-free region 54. Hence, Applicant's chip being covered by the second adhesive layer (4) and antenna and does not have an adhesive-free region or an air gap is clearly different from Baldwin.

As previously submitted, in the label according to Baldwin, this air gap is mandatory so as to render the RFID chip as less recognizable as possible. Therefore, the RFID chip in accordance with Baldwin's description with the above-discussed air gap 35 does not include Applicant's claimed features wherein the chip being covered by the second adhesive layer and is sealed by the second adhesive layer against environmental influences including one of water, suds, chemical cleaning agents and heat by the second adhesive layer, and the antenna being sealed against the environmental influences by the first and the second adhesive layer, as recited in amended claim 1.

Further, Applicant's invention includes a textile base layer, while Baldwin utilizes sheets 12 and 16 made of paper, as described in col. 3, line 46 of Baldwin. In page 3, lines 4-5 of the Office Action, the Examiner contends that paper appears to be within the scope of a textile base layer. In response, Applicant respectfully requests the Examiner to provide an appropriate authority that teaches paper material as being within the scope of textile. Further, as paper may not have tear-resistant property, Baldwin teaches the use of tear resistant layer 32 between paper sheet 36 and the antenna 53. Paper sheet 12 is not covered by any tear-resistant layer, however. In view of the clear usage of paper material in Baldwin, Applicant

respectfully submits that Baldwin does not teach, disclose, or suggest a textile base layer, and that paper cannot be construed as textile in this case.

With respect to Loemker, as previously submitted, the cited reference does not teach, disclose, or suggest the sealing of a RFID chip using adhesive layers. Further, Loemker does not teach, disclose or suggest the chip being covered by the second adhesive layer and is sealed by the second adhesive layer against environmental influences including one of water, suds, chemical cleaning agents and heat by the second adhesive layer, and the antenna being sealed against the environmental influences by the first and the second adhesive layer, as recited in amended claim 1.

With respect to Tirkkonen, as previously argued, this patent does not deal with the sealing of a chip within a label, and even less with the sealing with two adhesive layers. There is simply no suggestion to a person of ordinary skill in the art for sealing a transponder arrangement by means of two adhesive layers, wherein the chip being covered by the second adhesive layer and is sealed by the second adhesive layer against environmental influences including one of water, suds, chemical cleaning agents and heat by the second adhesive layer, and the antenna being sealed against the environmental influences by the first and the second adhesive layer, as recited in amended claim 1.

Moreover, as previously submitted, Tirkkonen describes a smart label which may be attached to a textile material. The label comprises a chip 2 fixed to the label 1 with an adhesive layer 3 and a back film 4 (see Figure 2 and page 5, lines 20-26). As described on page 4, line 37 to page 5, line 5, an electroconductive ink is printed on the back film or a metal film is etched or punched to manufacture the antenna of the smart label. Therefore, the use of a foil is mandatory in combination with a label according to Tirkkonen. A substitution of such a foil with a textile layer is not suggested.

Further, manufacture the antenna of the chip as disclosed by Tirkkonen would not be realizable if a textile label were to be disposed as the back film, since electroconductive ink could not be printed on a textile label so as to form an antenna for a RFID chip. Thus, Tirkkonen would appear to teach away from use of a textile upper label as recited in amended claim 1.

As set forth above, Baldwin, Loemker, Tirkkonen, and Matsuzaki, combined or separately, fail to teach, disclose, or suggest the chip being covered by the second adhesive layer and is sealed by the second adhesive layer against environmental influences including one of water, suds, chemical cleaning agents and heat by the second adhesive layer, and the antenna being sealed against the environmental influences by the first and the second adhesive layer, as recited in amended claim 1.

In view of the amendment and arguments set forth above, Applicant respectfully requests reconsideration and withdrawal of the §103(a) rejection of claims 1, 3-7 and 10-16.

3. Conclusion

In view of the amendments to the claims, and in further view of the foregoing remarks, it is respectfully submitted that the application is in condition for allowance. Accordingly, it is requested that claims 1-7 and 10-16 be allowed and the application be passed to issue.

If any issues remain that may be resolved by a telephone or facsimile communication with the Applicant's representative, the Examiner is invited to contact the undersigned at the numbers shown.

Further, while no fees are believed to be due, the Commissioner is hereby authorized to charge any additional fees which may be required, or credit any overpayment to Deposit Account No. 50-4525.

Respectfully submitted,

/Donald R. Studebaker/
Donald R. Studebaker
Registration No. 32,815

Studebaker & Brackett PC
One Fountain Square
11911 Freedom Drive
Suite 750
Reston, Virginia 20190
(703) 390-9051
Fax: (703) 390-1277
don.studebaker@sbpatentlaw.com